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Dairy Farms Five Year Summary

1979 - 1983

1979 - 1983

NOVA SCOTIA DAIRY FARM

BUSINESS SUMMARY REPORT

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INTRODUCTION

This report provides a summary of the business performance of Nova Scotia dairy farms over a five year period, 1979-1983 inclusive. Data used in the preparation of this summary was obtained from the Nova Scotia Dairy Farm Business Summaries prepared in each of the five years included in this report.

As noted in the Dairy Farm Business Summaries, the farms used were not selected on a random sample basis, but rather volunteered their information. Hence, care should be exercised in the interpretation and use of the results shown in this summary.

The main purpose of this summary is to provide basic information on the dairy industry, at the farm level, in Nova Scotia over a five year period. Trends in incomes, costs, net returns, efficiency and management factors are outlinecd.

We gratefully acknowledge the co-operation of the dairy producers whose business information has been used to prepare this summary. We further acknowledge the work of Debbie Freeman, Farm Management Technician who prepared the data for the summary, and Tracey Mitchell for the secretarial work.

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SECTION A

SUMMARY

SUMMARY

This report provides information on trends that have occured at the farm level in the Dairy Industry over the five year period, 1979-1983, inclusive. As noted earlier, the farms used to provide the basic data were not selected on a random sample basis. However, even with this noted limitation, the information contained in this summary can be used with care to provide useful trend data regarding the dairy industry in Nova Scotia.

The material is presented in the following manner - a brief summary or ratios, cost and return data, and management factors on a per farm, per cow and per hectolitre basis. The format used for presentation of information is similar to that used in the Annual Dairy Farm Business Summaries.

In reviewing information contained in Table A-1, a number of observations can be made. Gross Farm Income has increased in each of the five years with an overall increase of some 36 percent over the five year period. At the same time, costs have increased 38 percent over this period. Net Farm Income has increased by 21 percent over the period.

Production per cow has shown a modest increase over the five years, with the change over the period being 1.2 percent. Production has grown from 5,369 litres in 1979 to 5,434 litres in 1982, with a slight decrease of 84 litres from 1982 to 1983. Milk sold per man equivalent has decreased by 7 percent over the period.

In terms of prices received from milk, this figure has also changed over the period, from an average price of $32.31 per hectolitre in 1979 to $45.21 in 1983. This represents a change in percentage terms of 40 percent. While returns have been increasing, costs have been on the rise as well. The cost of producing a hectolitre of milk averaged $32.98 in 1979, while in 1983 this figure was $46.65 - for a percentage change of 41 percent. The net return to the farmer remained a negative - that is, the net cost was greater than the return. In 1983, the net return was -$1.44 per hectolitre.

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The largest individual component of cost in producing milk is purchased dairy ration. On a per cow basis, this item has increased from $573.00 in 1979 to $683.00 in 1983, for a change of some 19 percent. It should be noted that the 1983 figure of $683.00 is down from the 1982 figure of $702.00. On a per hectolitre of milk sold basis, the cost of feed increased by some $1.91 from $10.66 in 1979 to $12.57 in 1983, but also showed a decrease from 1982 to 1983.

Investment per cow has increased gradually over the period with the change over the five year period being 53 percent.

Return to total invested capital shows an increase of 41 percent from the 1982 rate, with a slight increase in the five year period of 6 percent.

Capital turnover has remained relatively unchanged over the five year period.

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TABLE A-1: SUMMARY

ITEM	1979	1980	1981	1982	1983
Gross Farm Income	135,751	158,330	170,256	177,915	184,286
Total Farm Expenses	119,173	141,202	157,650	163,422	164,257
Net Farm Income	16,578	17,128	12,605	14,493	20,029
Labor & Management Income	8,662	7,424	841	1,121	9,216
# of Cows/Farm	63	65	65	63	61
Production/Cow (L)	5,369	5,583	5,445	5,518	5,434
Cows/Man Equivalent	25	29	26	25	23
Milk Sold/Man Equivalent (HL)	1,370	1,588	1,423	1,391	1,271
Receipts from Milk/HL	32.31	35.61	40.32	43.18	45.21
Cost of Producing Milk/HL	32.98	36.76	43.93	46.93	46.65
Net Return/HL	-0.67	-1.15	-3.61	-3.75	-1.44
Variable Cost as % of Total Cost	65	66	65	66	66
Fixed Cost as % of Total Cost	21	20	21	20	20
Opportunity Cost as % of Total Cost	14	14	14	14	14
Purchased Feed/Cow ($)	573	692	731	702	683
Feed Cost/HL Milk ($)	10.66	12.40	13.42	12.73	12.57
Feed Cost as % of Milk Sold ($)	35.4	37.3	35.2	29.5	27.8
Investment/Cow ($)	2,950	3,336	3,836	4,110	4,506
Return on Investment (%)	6.8	7.0	4.6	5.1	7.2
Capital Turnover (Yrs)	1.4	1.4	1.5	1.5	1.5

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SECTION B

PER FARM ANALYSIS

INCOME

Total Farm Receipts increased from an average of $130,932. in 1979 to $178,879. in 1983 - an increase of 37 percent.

Income from milk and milk subsidies accounted for 84 percent of Total Farm Receipts.

TABLE B-1: INCOME

ITEM	1979	1980	1981	1982	1983
Milk Sales	101,892	120,265	134,030	143,299	143,727
Milk Subsidy	7,676	9,008	7,679	6,912	6,081
Livestock Sales	11,930	13,196	11,905	12,793	13,308
Crop Sales	907	1,538	2,386	2,547	2,966
Miscellaneous	8,527	9,229	11,171	10,948	12,797
TOTAL FARM RECEIPTS	130,932	153,236	167,172	176,500	178,879

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EXPENSES

Expenses on a per farm basis increased from an average of $102,002. in 1979 to $145,311. in 1983. This represents a change of some 42 percent in Cash Expenses. Purchased dairy feed, the largest single cost item has dropped to 29% of Cash Expenses from a relatively constant 35-38 percent in other years.

TABLE B-2: EXPENSES

ITEM	1979	1980	1981	1982	1983
Dairy Feed	36,100	44,904	47,161	44,272	41,637
Livestock Purchased	7,052	6,584	5,981	3,296	4,747
Milk Hauling	3,693	4,206	4,746	5,333	5,470
Crop Expenses	7,495	9,202	10,151	7,258	10,946
Tractor & Machinery	5,762	7,257	9,016	10,517	9,919
Truck & Auto	2,045	2,270	2,319	2,512	3,541
Interest	7,721	10,137	12,707	13,452	14,363
Labor	8,205	9,746	12,098	13,012	13,828
Taxes	583	685	809	897	1,051
Milk Marketing Costs	3,867	4,312	4,742	7,258	8,476
Dairy Supplies	2,325	2,811	3,270	3,676	3,801
Vet & Drugs	1,091	1,345	1,493	1,707	1,884
Breeding	1,113	1,337	1,599	1,587	1,913
Building & Fence Repairs	2,865	3,328	3,321	3,656	3,849
Utilities	3,475	3,923	3,979	4,433	4,529
Insurance	1,948	2,182	2,296	2,437	2,566
Miscellaneous	6,662	7,920	10,659	12,506	12,791
TOTAL CASH EXPENSES	102,002	122,147	136,347	142,477	145,311

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INCOME SUMMARY

In reviewing different measures of income over the five (5) year period, it can be noted that the trend of increasing income carried through to these levels as well. Net Cash Income has increased by some 16 percent over the period from $28,930. in 1979 to $33,568. in 1983. Net Farm Income has also increased from $16,578 in 1979 to $20,029. in 1983, an increase of 21 percent.

Although, Labor and Management Income showed a decrease in the three years following 1979, the 1983 value of $9,216. is an increase of 6 percent from the 1979 value of $8,662.00.

TABLE B-3: INCOME SUMMARY

ITEM	1979	1980	1981	1982	1983
Total Farm Receipts	130,932	152,236	167,172	176,500	178,879
Total Cash Expenses	102,002	122,147	136,347	142,477	145,311
NET CASH INCOME	28,930	30,089	30,825	34,023	33,568
Plus: Inventory Change	4,819	5,094	3,084	1,415	5,407
Less: Depreciation	17,171	19,055	21,303	20,945	18,946
NET FARM INCOME	16,578	17,128	12,606	14,493	20,029
Less: Value of Unpaid Family Labor	781	652	454	588	569
Interest on Net Worth @ 10% (11% in 1981) (12% in 1982)	7,135	9,052	11,311	12,784	10,244
LABOR & MANAGEMENT INCOME	8,662	7,424	841	1,121	9,216

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SECTION C

PER COW ANALYSIS

INCOME

When figures are calculated on a per cow basis, Total Farm Receipts have increased by 41 percent over the five (5) year period - from $2,083. in 1979 to $2,934. in 1983.

TABLE C-1: INCOME

ITEM	1979	1980	1981	1982	1983
Milk Sales	1,623	1,854	2,077	2,273	2,357
Milk Subsidy	122	139	119	110	100
Livestock Sales	190	203	184	203	218
Crop Sales	14	24	37	40	49
Miscellaneous	134	142	173	174	210
TOTAL FARM RECEIPTS	2,083	2,362	2,590	2,800	2,934

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EXPENSES

Over the five (5) year period, Cash Expenses have increased from $1,625. per cow in 1979 to $2,383. in 1983 - a change of $758. per cow or some 47 percent.

TABLE C-2: EXPENSES

ITEM	1979	1980	1981	1982	1983
Dairy Feed	575	692	731	702	683
Livestock Purchased	112	101	93	52	78
Milk Hauling	59	65	74	85	90
Crop Expenses	119	142	157	189	180
Tractor & Machinery	92	112	140	167	163
Truck & Auto	33	35	36	40	58
Interest	123	156	197	213	236
Labor	131	150	187	206	227
Taxes	9	11	13	14	17
Milk Marketing Costs	62	66	73	115	139
Dairy Supplies	37	43	51	58	62
Vet & Drugs	17	21	23	27	31
Breeding	18	21	25	25	31
Building & Fence Repairs	46	51	51	58	63
Utilities	55	60	62	70	74
Insurance	31	34	36	39	42
Miscellaneous	106	122	165	198	210
TOTAL CASH EXPENSES	1,625	1,883	2,113	2,260	2,383

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INCOME SUMMARY

Net Cash Income on a per cow basis has increased by $93. or by 20 percent over the period. Net Farm Income has increased by $67. per cow between 1979 and 1983. It will be noted that Net Farm Income dropped in 1981 from the 1980 high of $264.00, but shows an increase again in 1982. A similar trend occurred in Labor and Management Income - a decrease being observed in the three years following 1979, with the 1983 figure increasing by $16. per cow from 1979. An increase of 12 percent over the five (5) year period is noted.

TABLE C-3: INCOME SUMMARY

ITEM	1979	1980	1981	1982	1983
Total Farm Receipts	2,083	2,362	2,590	2,800	2,934
Total Cash Expenses	1,625	1,883	2,113	2,260	2,383
NET CASH INCOME	458	479	477	540	551
Plus: Inventory Change	77	79	48	22	89
Less: Depreciation	273	294	330	332	311
NET FARM INCOME	262	264	195	230	329
Less: Value of Unpaid Family Labor	12	10	7	9	9
Interest on Net Worth @ 10% (11% in 1981) (12% in 1982)	114	140	175	203	168
LABOR & MANAGEMENT INCOME	136	114	13	18	152

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SECTION D

PER 100 LITRES ANALYSIS

INCOME

Analysis of Total Farm Receipts on a per hectolitre of milk sold basis indicates that Farm Receipts have increased by $15.39 per hectolitre over the period. This translates to a change of 40 percent.

TABLE D-1: INCOME

ITEM	1979	1980	1981	1982	1983
Milk Sales	30.04	33.13	38.14	41.19	43.37
Milk Subsidy	2.26	2.48	2.19	1.99	1.84
Livestock Sales	3.52	3.64	3.39	3.68	4.02
Crop Sales	0.27	0.42	0.68	0.73	0.90
Miscellaneous	2.51	2.54	3.18	3.15	3.86
TOTAL FARM RECEIPTS	38.60	42.21	47.57	50.74	53.99

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EXPENSES

Cash Expenses increased by $13.79 on a per hectolitre of milk sold basis over the five (5) year period. In percentage terms, this represents a change of 46 percent.

TABLE D-2: EXPENSES

ITEM	1979	1980	1981	1982	1983
Dairy Feed	10.64	12.37	13.42	12.73	12.57
Livestock Purchased	2.08	1.81	1.70	0.95	1.43
Milk Hauling	1.09	1.16	1.35	1.53	1.65
Crop Expenses	2.21	2.54	2.89	3.43	3.30
Tractor & Machinery	1.70	2.00	2.57	3.02	2.99
Truck & Auto	0.60	0.63	0.66	0.72	1.07
Interest	2.28	2.79	3.62	3.87	4.33
Labor	2.42	2.68	3.44	3.74	4.17
Taxes	0.17	0.19	0.23	0.26	0.32
Milk Marketing Costs	1.14	1.19	1.35	2.09	2.56
Dairy Supplies	0.69	0.77	0.93	1.06	1.15
Vet & Drugs	0.32	0.37	0.42	0.49	0.57
Breeding	0.33	0.37	0.46	0.46	0.58
Building & Fence Repairs	0.84	0.92	0.94	1.05	1.16
Utilities	1.02	1.08	1.13	1.27	1.37
Insurance	0.57	0.60	0.65	0.70	0.77
Miscellaneous	1.96	2.18	3.03	3.60	3.86
TOTAL CASH EXPENSES	30.07	33.65	38.80	40.86	43.86

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INCOME SUMMARY

An analysis of income on a per hectolitre of milk sold basis reveals Net Cash Income increased by $1.60 over the five (5) year period. Net Farm Income also shows an increase of $1.16 per hectolitre over the five (5) year period.

Labor and Management Income showed a slight increase of $23. per hectolitre over the period.

TABLE D-3: INCOME SUMMARY

ITEM	1979	1980	1981	1982	1983
Total Farm Receipts	38.60	42.21	47.57	50.74	53.99
Total Cash Expenses	30.07	33.65	38.80	40.96	43.86
NET CASH INCOME	8.53	8.56	8.77	9.78	10.13
Plus: Inventory Change	1.42	1.40	0.88	0.41	1.63
Less: Depreciation	5.06	5.25	6.06	6.02	5.72
NET FARM INCOME	4.89	4.72	3.59	4.17	5.05
Less: Value of Unpaid Family Labor	0.23	0.18	0.13	0.17	0.17
Interest on Net Worth @ 10% (11% in 1981) (12% in 1982)	2.10	2.49	3.22	3.68	3.09
LABOR & MANAGEMENT INCOME	2.56	2.05	0.24	0.32	2.79